

2300/126

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE



Applicants: Elazer R. Edelman, Aruna Nathan and Matthew A. Nugent

08/458,978

Art Unit: 1808

Filed: June 2, 1995

Examiner: D. Naff

For: Inhibition of Vascular Occlusion Following Intervention

Assistant Commissioner
for Patents
Washington, D.C. 20231

RECEIVED
97 MAY 19 PM 3:29
GROUP 130

INFORMATION DISCLOSURE STATEMENT

Sir:

Pursuant to the duty of disclosure under 37 C.F.R. §1.56, Applicants cite the following publications, which are listed on the enclosed three pages of Form PTO-1449, and copies of which are enclosed. Also enclosed is a copy of the Search Report for the corresponding PCT application. The publications marked with an asterisk are unavailable at the present time. Copies will be provided as they become available.

Also enclosed is a check for \$230.00 for consideration of this Information Disclosure Statement. The Assistant Commissioner is authorized to charge any fee to Deposit Account No. 01-2507, if any further charge is required.

425817.1

300 SH 05/14/97 08458978
1 126 230.00 CK
MIT 6584
20220 / 190

Foreign Documents

<u>Number</u>	<u>Publication Date</u>	<u>Country</u>
*WO 93 02188	02/04/93	PCT
*WO 93 14193	07/22/93	PCT
*EP 0518389	12/16/92	EPO

Publications

Bjornsson et al., "Acidic Fibroblast Growth Factor Promotes Vascular Repair," *Proc. Natl. Acad. Sci. USA*, 88: 8651-8655 (1991)

Castellot et al., "Cultured Endothelial Cells Produce a Heparinlike Inhibitor of Smooth Muscle Cell Growth," *J. Cell Biol.*, 90: 372-9 (1981)

*Centra, M., et al., "Culture of Bovine Pulmonary Artery Endothelial Cells on Gelfoam Blocks," *FASEB J.*, 6:3117-3121 (1992).

*Clowes, A. et al., "Kinetics of Cellular Proliferation After Arterial Injury I: Smooth Muscle Growth in the Absence of Endothelium," *Lab. Invest.*, 49:327-333 (1983)

*Conte, M., et al., "Endothelial Cell Seeding Fails to Attenuate Intimal Thickening in Balloon Injured Rabbit Arteries," *Journal of Vascular Surgery*, 21(3):413-421 (March, 1995)

Cooke et al., "Cellular Mechanisms of Atherogenesis and the Effects of Nitric Oxide," *Curr. Opin. Cardiol.*, 7: 799-804 (1992)

*Edelman, et al., "Effect of Controlled Adventitial Heparin Delivery on Smooth Muscle Cell Proliferation Following Endothelial Injury," *Proc. Natl. Acad. Sci. (USA)*, 87:3773-3777 (1990)

Edelman, E.R. & Karnovskv, M.J. "Contrasting Effects of the Intermittent and Continuous Administration of heparin in Experimental Restenosis," *Circ.* 89: 770-776 (1994)

Edelman, et al., "Basic Fibroblast Growth Factor Enhances the Coupling of Intimal Hyperplasia and Proliferation of Vasa Vasorum in Injured Rat Arteries," *J. Clin. Invest.* 89:465-471 (1992)

Ellis et al., "Effect of 18- to 24-hour Heparin Administration for Prevention of Restenosis After Uncomplicated Coronary Angioplasty," *Am. Heart. J.*, 117: 777-782 (1989)

*Esko, J., "Animal Cell Mutants Defective in Heparan Sulfate Polymerization," Heparin and Related Polysaccharides, (Lane, Bjork, & Lindahl, Eds.) Plenum Press, pp 97-106 (1992)

Farndale, et al., "Improved Quantitation and Discrimination of Sulphated Glycosaminoglycans by Use of Dimethylmethylene Blue," *Biochimica et Biophysica Acta* 883:173-177 (1986)

Fishman et al., "Endothelial Regeneration in the Rat Carotid Artery and the Significance of Endothelial Denudation in the Pathogenesis of Myointimal Thickening," *Lab. Invest.*, 32: 339-51 (1975)

Gimbrone, M., "Culture of Vascular Endothelium," *Progress Hemostasis and Thrombosis* 3:1-28 (1976).

*Lee, Y., et al., "Endothelial Cell Seeding Onto the Extracellular Matrix of Fibroblasts for the Development of a Small Diameter Polyurethane Vessel," ASAIO Journal, 39(3):M7450M745 (July, 1993)

McNamara, et al., "L-Arginine Inhibits Balloon Catheter-Induced Intimal Hyperplasia," *Biochem. Biophys. Res. Comm.*, 193: 291-296 (1993)

Moncada et al., "The L-Arginine-Nitric Oxide Pathway," *N. Engl. J. Med.*, 329: 2002-2012 (1993)

Nugent et al., "Vascular Cell-Derived Heparan Sulfate Shows Coupled Inhibition of Basic Fibroblast Growth Factor Binding and Mitogenesis in Vascular Smooth Muscle Cells," *Circulation Research*, 73: 1051-1060 (1993)

Schwartz et al., "The Aortic Intima. II. Repair of the Aortic Lining After Mechanical Denudation," *Am. J. Pathol.*, 81: 15-42 (1975)

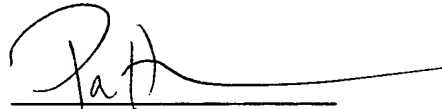
Remarks

This statement should not be interpreted as a representation that an exhaustive search has been conducted or that no better art exists. Moreover, Applicants invite the

U.S.S.N. 08/458,978
Filed: June 2, 1995
INFORMATION DISCLOSURE STATEMENT

Examiner to make an independent evaluation of the cited art to determine its relevance to the subject matter of the present application. Applicants are of the opinion that their claims patentably distinguish over the art referred to herein, either alone or in combination.

Respectfully submitted,



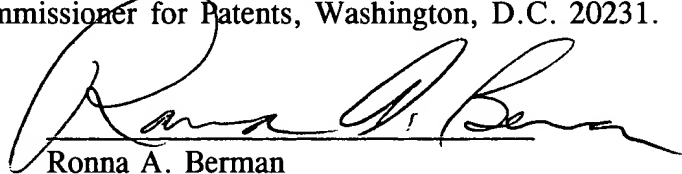
Patrea L. Pabst
Reg. No. 31,284

Dated: April 28, 1996
ARNALL GOLDEN & GREGORY
2800 One Atlantic Center
1201 W. Peachtree Street
Atlanta, Georgia 30309-3450
(404) 873-8794

CERTIFICATE OF MAILING (37 CFR 1.8a)

I hereby certify that this Information Disclosure Statement, along with any paper referred to as being attached or enclosed, is being deposited with the United States Postal Service on the date shown below with sufficient postage as first-class mail in an envelope addressed to the Assistant Commissioner for Patents, Washington, D.C. 20231.

Date: April 28, 1997


Ronna A. Berman